

What is claimed is:

1. A system for managing the delivery of services over a network, comprising:  
a plurality of distributed network entities configurable to deliver specified services;

5 a plurality of service agents operable to configure one or more of said distributed network entities associated therewith in response to messages received at a generic interface; and

a central controller for generating said messages using a common instruction set for all said network entities, said central controller including a database storing attributes defining the configuration of said network entities.

10 2. A system as claimed as claim 1, further comprising service drivers associated said network entities and responsive to instructions from said service agents to generate hardware specific commands to configure said network elements in accordance with instructions from said central controller.

15 3. A system as claimed in claim 2, wherein said attributes are stored in said database in a directory structure mapped to said network entities.

4. A system as claimed in claim 1, wherein said messages are defined in XML language transported over secure http.

20 5. A system as claimed in claim 1, further comprising a service portals generated by said SDPs to present service offerings to local customers on the basis of policies stored in said database at said central controller.

6. A system as claimed in claim 5, wherein said service portals are in the form of web pages.

25 7. A system as claimed in claim 1, further comprising a user interface connected to said central controller and presenting a form-based screen to permit entry of configuration information into said database.

8. A system as claimed in claim 1, wherein said entities are servers for locally delivering broadband services to customers connected thereto.

9. A system as claimed in claim 1, wherein at least some of said network entities include hardware devices providing specific services.

10. A system as claimed in claim 9, wherein said network entities include specific service offerings defined in said central controller.

5 11. A method of controlling the delivery of services to customers over a network, comprising the steps of:

providing a plurality of distributed network entities capable of providing services to customers connected thereto;

10 providing at each of said distributed network entities a service agent responsive to commands using a common instruction set received at a generic interface to configure said network entities;

providing a central controller for generating said commands to configure said network entities;

15 storing in a database associated with said central controller policy attributes

determining the configuration of said network entities; and

20 sending said commands to said network entities to configure said network entities in accordance with policies established in said central controller.

12. A method as claimed in claim 11, wherein said commands are transported over the network.

20 13. A method as claimed in claim 11, further comprising providing at said network entities service drivers responsive to instructions from said service agents to generate entity specific instructions to configure said network entities.

14. A method as claimed in claim 13, wherein said service drivers are stored on said central controller and download to said network entities over said network.

25 15. A method as claimed in claim 11, wherein said commands are transported in messages using a common language and protocol.

16. A method as claimed in claim 15, wherein said messages are transported over said network as XML documents using secure http protocol.

17. A method as claimed in claim 11, wherein said database has a directory tree structure having components of said directory structure mapped to network resources.

18. A method as claimed in claim 17, wherein said directory structure includes branches associated respectively with customers, services, and hardware entities offering service portals for customers.

19. A method as claimed in claim 18, wherein said service portals comprise web pages stored on said hardware entities and providing forms to permit users to make service requests, said service agents send said service requests to the central controller via the generic interface, said central controller updates said database in response to said service requests, and said central controller then initiates an instance of a requested service for a user how has requested the service.

20. A method as claimed in claim 11, wherein said network elements include software elements offering network services.

21. A method as claimed in claim 11, wherein said central controller additionally communicates with a billing server to provide billing services.

22. A method of managing a plurality of network elements to define service offerings from a central location, comprising:

storing in a computer a model identifying service offerings, users, and delivery points;

defining within said model specific service offerings using a common language; receiving service requests for offerings from identified users in said common language and inputting said requests into said model;

configuring said model using said common language to implement said service requests within said model; and

forwarding instructions in said common language from said model to a service drivers associated with said network element, said service driver translating said instructions in said common language into hardware specific instructions associated with said network elements in order to implement said service requests.

23. A method as claimed in claim 22, wherein said model is implemented as a directory structure having branches associated respectively with said service offerings, users, and delivery points.

24. A method as claimed in claim 22, wherein said common language is XML.

5 25. A method as claimed in claim 25, wherein said XML documents within said model are generated from XSL style sheets.

*Rule 126*  
<sup>26</sup>  
~~28~~. A method as claimed in claim 24, wherein said instructions are forwarded to said service drivers using a secure protocol.

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~~26~~. A method as claimed in claim 25, wherein said secure protocol is https.

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